

~~WHAT IS CLAIMED IS:~~

1. A method of generating three-dimensional form data comprising the steps of:

5 generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

10 projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

15 modifying the curved surface by moving lines in the curve group projected to the three-dimensional form model.

2. ~~A method of generating three-dimensional form data~~ comprising the steps of:

20 generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

25 projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

modifying the curved surface by moving lines in the ~~curve group projected to the three-dimensional form model~~.

2. The method according to claim 1, wherein said curve group comprises a parametric curve group.

*P2*  
*Final.*

3. The method according to claim 2, wherein in said modifying step, by moving control points of the parametric curve group, a part of the parametric curve group in correspondence to the movement of the control points is moved along the surface of the form model.

*Sub 3 J*

4. The method according to claim 3, wherein the three-dimensional form data are generated by using a display device.

*Sub DS*

5. The method according to claim 1, wherein said curve group comprises a spline curve group.

6. The method according to claim 5, wherein the three-dimensional form data are generated by using a display device.

~~WIP~~  
7. A method of generating three-dimensional form data comprising the steps of:

generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

*<*  
projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

*<*  
adding a line projected to the three-dimensional form model to the curve group projected to the three-dimensional form model wherein the curved surface is modified.

8. A method of generating three-dimensional form data comprising the steps of:

generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

5 projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

10 deleting a line in the curve group projected to the three-dimensional form model wherein the curved surface is modified.

9. A memory for storing a method for generating three-dimensional form data, the memory comprising:

15 a means for generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

a means for projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

20 a means for modifying the curved surface by moving lines in the curve group projected to the three-dimensional form model.

10. The memory according to claim 9, wherein said memory comprises a magnetic medium.

11. The memory according to claim 9, wherein said memory comprises a flexible disk.

12. The memory according to claim 9, wherein said memory comprises a hard disk.

5 13. A memory for storing a method of generating three-dimensional form data comprising:

a means for generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

10 a means for projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

15 a means for adding a line projected to the three-dimensional form model to the curve group projected to the three-dimensional form model wherein the curved surface is modified.

14. The memory according to claim 13, wherein said memory comprises a magnetic medium.

20 15. The memory according to claim 13, wherein said memory comprises a flexible disk.

16. The memory according to claim 13, wherein said memory comprises a hard disk.

25 17. A memory for storing a method for generating three-dimensional form data comprising:

a means for generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

5 a means for projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

10 a means for deleting a line in the curve group projected to the three-dimensional form model wherein the curved surface is modified.

18. The memory according to claim 17, wherein said memory comprises a magnetic medium.

19. The memory according to claim 17, wherein said memory comprises a flexible disk.

15 20. The memory according to claim 17, wherein said memory comprises a hard disk.

21. An apparatus of generating three-dimensional form data comprising:

20 a means for generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

25 a means for projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

a means for adding a line projected to the three-dimensional form model to the curve group projected to the three-dimensional form model wherein the curved surface is modified.

- 5 22. An apparatus of generating three-dimensional form data comprising:

a means for generating horizontal closed curves and vertical lines intersecting the closed curves, the closed curves and the lines including a three-dimensional form model;

10 a means for projecting the closed curves and the lines to the three-dimensional form model to generate a curved surface including a curve group along the three-dimensional form model; and

15 a means for deleting a line in the curve group projected to the three-dimensional form model wherein the curved surface is modified.

